

ABSTRACT OF THE DISCLOSURE

A METHOD AND APPARATUS FOR CALCULATING CRYPTOGRAPHIC  
CHECKSUMS ACROSS PACKETS ENABLING DATA  
MANIPULATION AND TRANSCODING WITHOUT DECRYPTION

Disclosed are a method and apparatus for ensuring the integrity of data. In one embodiment, the present invention, for a plurality of data packets comprising a plurality of first data segments and a plurality of second data segments, calculates a cryptographic checksum for the plurality of first data segments and enables the cryptographic checksum for the plurality of first data segments to be transmitted separately from the plurality of data packets.